

Q T
255
M483e
1924

EXERCISES FOR
HEALTH

BY
LENNA L. MEANES, M.D.



THE NATIONAL
HEALTH SERIES

SURGEON GENERAL'S OFFICE

LIBRARY

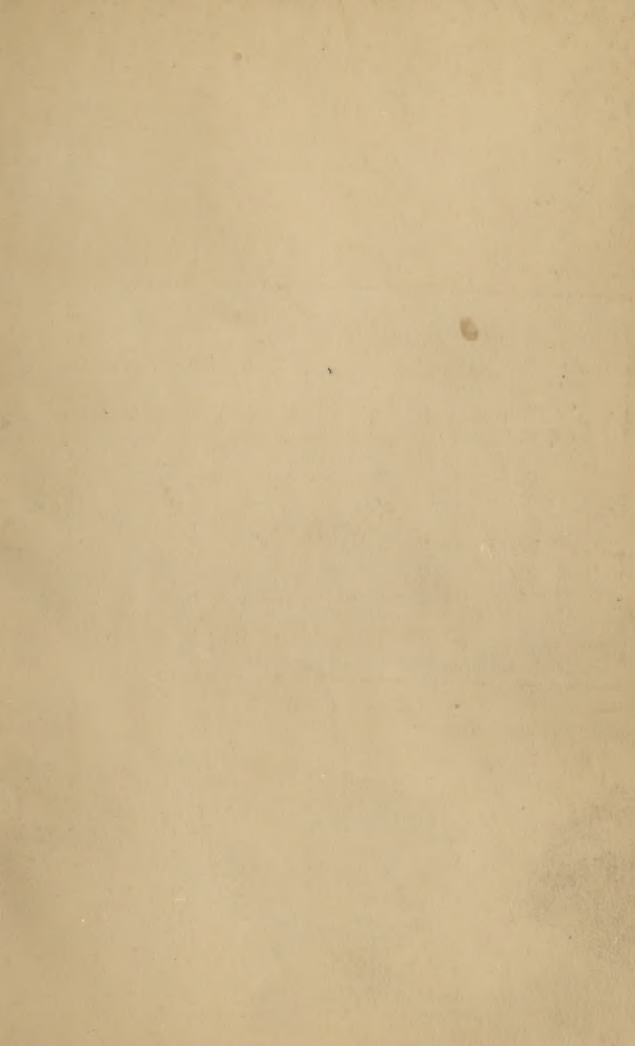
Section

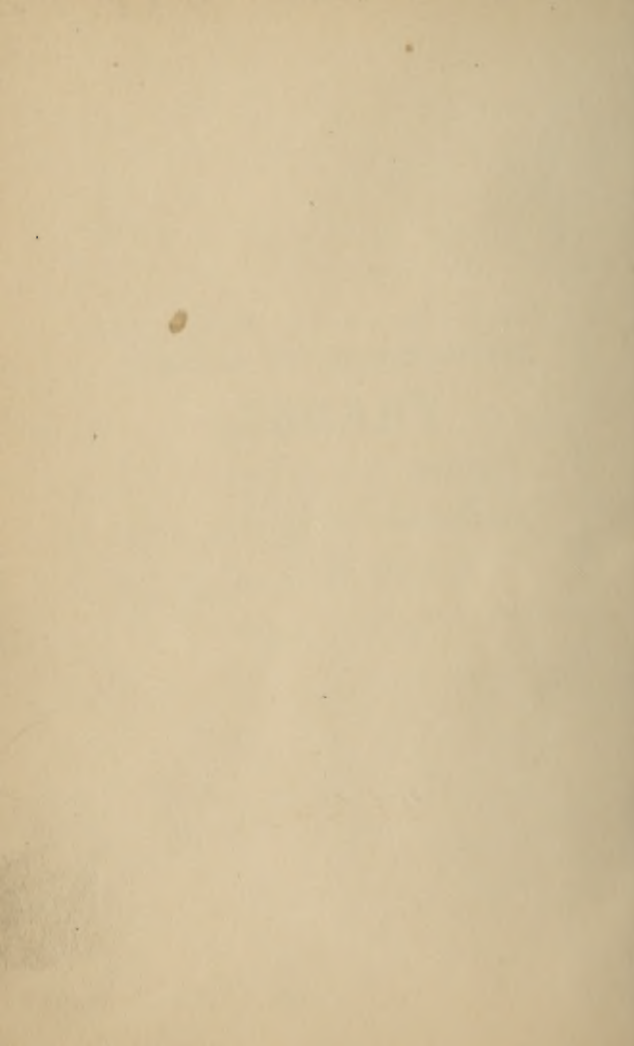
Gymnastics

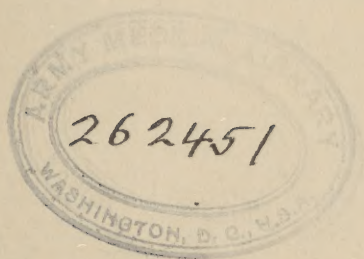
Form 113c. No.
W.D.,S.G.O.

262451

GOVERNMENT PRINTING OFFICE







Announcement

NATIONAL HEALTH SERIES

In order to provide the general public with authoritative books on health at low cost, the National Health Council has arranged with the Funk & Wagnalls Company for the publication of The National Health Series. This series contains twenty books on all phases of human health, written by the leading authorities in the United States.

Man and the Microbe; How Communicable Diseases are Controlled. By C.-E. A. Winslow, Dr. P. H.; Professor of Public Health, Yale School of Medicine.

A description of germs and germ diseases and how they are spread, together with practical methods of disease prevention by means of sanitation.

The Baby's Health. By Richard A. Bolt, M.D., Gr. P. H.; Director, Medical Service, American Child Health Association.

How to care for the baby so that it will be healthy, will develop properly, and be strong and free from disease.

Personal Hygiene; The Rules for Right Living. By Allan J. McLaughlin, M.D.; Surgeon United States Public Health Service.

Practical suggestions as to how to apply personal hygiene to promote health and get the most out of life.

Community Health; How to Obtain and Preserve It. By D. B. Armstrong, M.D.; Sc.D.; Executive Officer of the National Health Council.

An outline of what the community should do for the health of its citizens and what each person should do to make his community a healthy place.

Cancer; Nature, Diagnosis, and Cure. By Francis Carter Wood, M.D.; Director, Institute for Cancer Research, Columbia University.

The best statement about cancer ever written for the laity. It tells what it is and how to know it and have it cured.

The Human Machine; How the Body Functions. By W. H. Howell, Ph.D., M.D., LL.D., Sc.D.; Associate Director, School of Hygiene and Public Health, Johns Hopkins University.

A non-technical, literary description of the anatomy and physiology and the human body, the most wonderful machine of all.

The Young Child's Health. By Henry L. K. Shaw, M.D.; Clinical Professor, Diseases of Children, Albany Medical College.

How to care for the health of the runabout child from two to six years of age.

The Child in School; Care of Its Health. By Thomas D. Wood, M.D.; Professor of Physical Education, Teachers College, Columbia University.

Promotion of health habits in children of school age and exactly how to go about it.

Tuberculosis; Nature, Treatment, and Prevention, by Linsly R. Williams, M.D.; Managing Director, National Tuberculosis Association.

Covers the whole field of tuberculosis, the cause, spread, treatment, prevention and duties of citizens, patients, and the community.

The Quest for Health; Where It is and Who can Help Secure It. By James A. Tobey, M.S.; Administrative Secretary, National Health Council.

A statement of what health is, how it may be obtained, and a description of the actual help which the government, States, municipalities, physicians, and voluntary health agencies can give to individuals.

NATIONAL HEALTH SERIES

(Continued)

Love and Marriage; Normal Sex Relations; By T. W. Galloway, Ph.D., Litt.D.; Associate Director of Educational Measures. American Social Hygiene Association.

The various elements, biological, social, and sexual, which make up a successful and happy married life.

Food for Health's Sake; What to Eat. By Lucy H. Gillett, M.A., Superintendent of Nutrition, Association for Improving the Condition of the Poor, New York.

An outline of what and how to eat for maximum efficiency and health building.

Health of the Worker; How to Safeguard It. By Lee K. Frankel Ph.D.; Chairman, National Health Council.

Hygiene and sanitation in factory and shop and how industrial workers can protect and promote their health.

Exercises for Health. By Lenna L. Meanes, M.D., Medical Director, Women's Foundation for Health.

Illustrative material giving to individuals the type of exercise best suited to each one's personal needs.

Venereal Diseases; Their Medical, Nursing, and Community Aspects. By W. F. Snow, M.D., General Director, American Social Hygiene Association.

A non-technical discussion of cause, spread, treatment, cure, and prevention of each of these diseases and related social hygiene questions.

Your Mind and You; Mental Health. By Frankwood E. Williams, M.D., Medical Director, National Committee for Mental Hygiene, and George K. Pratt, M.D.

Describes how your mind can be a friend or enemy and how it can be enlisted as your ally.

Taking Care of Your Heart. By T. Stuart Hart, M.D., President, Association for the Prevention and Relief of Heart Disease, New York.

How to avoid and prevent heart troubles, which form the leading cause of death in this country.

The Expectant Mother; Care of Her Health. By R. L. DeNormandie, M.L.; Specialist, Boston, Mass.

The health care needed during pregnancy in order that both mother and baby may be healthy and well.

Home Care of the Sick; By Clara D. Noyes, R. N.; Director of Nursing, American Red Cross.

What to do in the home when illness is present. Practical suggestions for the care of the sick.

Adolescence; Educational and Hygienic Problems. By Maurice A. Bigelow, Ph.D.; Professor of Biology and Director School of Practical Arts, Teachers College, Columbia University.

The scientific and sociological aspects of adolescence to explain the proper transition from childhood to adult life.

THE NATIONAL HEALTH SERIES

20 Volumes. 18mo. Flexible Fabrikoid. Average number of pages, 70.

Price per set, \$6.00 net; per volume, 30c. net.

FUNK & WAGNALLS COMPANY, Publishers
NEW YORK and LONDON

NATIONAL HEALTH COUNCIL

Direct Members

- American Child Health Association,
370 Seventh Avenue, New York City.
- American Public Health Association,
370 Seventh Avenue, New York City.
- American Red Cross,
17th Street between D and E, Washington, D. C.
- American Social Hygiene Association,
370 Seventh Avenue, New York City.
- American Society for the Control of Cancer,
370 Seventh Avenue, New York City.
- Conference of State and Provincial Health Authorities of
North America,
Care of State Department of Health, Lansing, Mich.
- National Committee for Mental Hygiene,
370 Seventh Avenue, New York City.
- National Committee for the Prevention of Blindness,
130 East 22d Street, New York City.
- National Organization for Public Health Nursing,
370 Seventh Avenue, New York City.
- National Tuberculosis Association,
370 Seventh Avenue, New York City.

Conference Members

- United States Public Health Service,
Washington, D. C.
- United States Children's Bureau,
Washington, D. C.

Associate Members

- American Association of Industrial Physicians and Surgeons,
Care of Dr. W. A. Sawyer, Eastman Kodak Co.,
Rochester, N. Y.
- Women's Foundation for Health,
370 Seventh Avenue, New York City.

OFFICERS

- Lee K. Frankel, Chairman.
- William F. Snow, M.D., Vice-Chairman.
- James L. Fieser, Recording Secretary.
- Linsly R. Williams, M.D., Treasurer.

STAFF

- A. J. Lanza, M.D., Executive Officer.
- James A. Tobey, Administrative Secretary.
- Thomas C. Edwards, Business Manager.
- Elizabeth G. Fox, Washington Representative.

Offices of the National Health Council

- Administrative:—370 Seventh Avenue, New York City.
- Washington:—17th and D Streets, N. W., Washington, D. C.

EXERCISES FOR HEALTH

BY

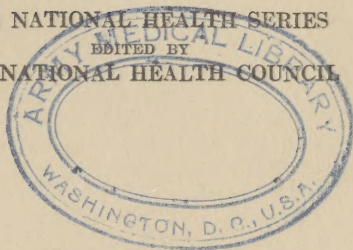
LENNA L. MEANES, M.D.

Medical Director, Women's Foundation for Health, Inc.

Assisted by

ESSE V. HATHAWAY

THE NATIONAL HEALTH SERIES
EDITED BY
THE NATIONAL HEALTH COUNCIL



FUNK & WAGNALLS COMPANY

NEW YORK AND LONDON

1924

QT

255

M483e

1924

Flora of the United States

COPYRIGHT, 1924, BY

FUNK & WAGNALLS COMPANY

Printed in the United States of America

Published, August, 1924

Copyright Under the Articles of the Copyright Convention
of the Pan-American Republics and the
United States, August 11, 1910

INTRODUCTION

IN THIS booklet of the National Health Series, Dr. Meanes has given us a publication as timely as it is valuable. Too long has the field of physical education been the happy hunting ground of the faddist, the ignorant enthusiast, and the quack. Bringing, as it does, authoritative word to bear on the subject, this booklet is an evidence that the medical profession realizes the possibilities, as well as the limitations, of the mechanical aspect of healing, and assumes its proper responsibility for what is one of the most important of the therapeutic agencies. The Women's Foundation for Health has struck a happy key-note in its expression "Positive Health," which is the banner under which its activities are conducted. Nowhere other than among the women of the nation, among the middle-aged particularly, is there a greater need for scientific physical education. We like to boast of the good looks and physique of our high-school and college girls. But the manager of a Turkish bath establishment for women once told the writer that the variations of the human form divine to be seen in the establishment in question were as remarkable as they were incredible. The failure of the musculature of the average woman to function normally is not only unnecessary; it not only detracts from the ideals of physical beauty, but is responsible, in part at least, for a host of those ills to which we attach the prefix "female." Dr. Meanes brings to this subject years of experience.

INTRODUCTION

For a number of years a general practitioner specializing in obstetrics, she later devoted her attention to public health, and has served as Chairman of the Child Welfare Committee, Public Health Section, General Federation of Women's Clubs for eight years; Chairman, Women's and Children's Welfare Committee of the Council on Health and Public Instruction of the American Medical Association for ten years; Lecturer for the National Board of the Y. W. C. A.; and Medical Director of the Women's Foundation for Health since it has established its headquarters in New York. Her booklet on physical education should fill a long felt want.

A. J. LANZA, M.D.,
Executive Officer,
National Health Council.

New York, *April*, 1924.

CONTENTS

I—HEALTH LEVELS	I
II—HEALTH PRESCRIPTIONS	8
III—EXERCISE A COMMON PRIVILEGE . .	13
IV—EXERCISES FOR TYPES AND OCCUPA- TIONS	27
V—INTERNAL CLEANLINESS.	40
VI—STANDING STRAIGHT WITH YOURSELF AND THE WORLD	44
VII—HEALTH AND PERSONALITY IN FEET .	51
VIII—WOMAN'S PLACE IN THE GAME OF HEALTH	64
IX—HEALTH LEVELS AGAIN	71

ACKNOWLEDGMENT

We wish to express grateful acknowledgement to the National Board of the Young Women's Christian Associations, for its cooperation in the original preparation of the Positive Health Series, many of the illustrations of which are used in this book; to Dr. Josephine H. Kenyon and Miss Jane Bellows for suggestions and criticisms of the manuscript of Exercises for Health, and to Miss Gertrude King for the selection and arrangement of the pin-men illustrations.

EXERCISES FOR HEALTH

CHAPTER I

HEALTH LEVELS

BUT, Doctor, do you mean to say that I have to take the responsibility, myself, of getting rid of these headaches, backaches—these grouches?"

"Just that. Nobody else can do it."

Well groomed, well dressed, well fed, overweight, flabby-muscled, heavy-eyed, the woman looked helplessly at the doctor.

"Whose health is it? There is nothing pathologically wrong with you," the doctor went on grimly. "Thank your stars for that. Your lungs, heart, and kidneys are in fine shape. You have a marvellous physique—wonderful possibilities, if you will make the most of them. How long they stay that way depends entirely on you. Stop taking headache tablets, indigestion tablets, constipation pills. Eat regularly of the things you know you should eat. Walk!—walk in good shoes every day until you can cover five miles and enjoy the last mile more than the first. Follow the individual-exercise prescription on your card there. Report to me say, two months from now."

"Report to you in two months—but where's my tonic?" Then, half aghast, half reproachfully, "You can't mean that I don't need one! Why I'm dead tired all the time and yet I can't sleep. You aren't telling me that I am not to take anything to make me relax and go to sleep, that I've got to grin and

bear my headaches and stomach trouble without taking a tablet? And eat regularly? You don't know what you are talking about. It isn't done these days. Besides people eat the things their hostesses set before them. And walk! My word, Doctor, I can't keep up with my day in riding."

"My dear Madame, you have tried your way and where are you? Try my prescriptions for a while and then let's check up. In the meantime, brace up, and accept the responsibility of becoming a real citizen—physically and mentally."

The woman gasped, blinked, and then capitulated.

"All right, I'll do it. But, may I say here and now that I'd infinitely rather pay you twenty-five dollars and shove the worry on your shoulders. Who is going to worry now?"

"Tell me that when you report two months from now."

Whether this story is literally true or not hasn't much to do with the situation, for nine out of ten doctors will recognize the type of patient and catch the familiar tone of the conversation. As a matter of fact the story is true—as told. What is more, it could be duplicated indefinitely, in point, with a range of characters to vary with the varying practise of physicians the world over. Nine out of ten physicians will recognize the truth of that also. Whether the examinee of the health examination will recognize the truth of this and see himself or herself—is another question.

B PLUS OR B MINUS

Between two extremes there is always an average marking a stretch of middle ground, level for a space, but dropping off along the lower edge into a bog of troubles; rising along the upper edge to a plane of high possibilities. Back in the days of the "A," "B,"

and "C" of our school grade-cards the most reckless felt a panic seize him if the "B," his comfortable average, happened to read "B—"; on the other hand the whole world grew rosy if that prosaic old card showed "B+." A sick sensation seizes a person if his bank balance shows "Overdrawn," despite the fact that he may have known it was bound to do just that. And the measure of this year's profits over last is the measure of vividness in the promise the day holds. In fact, humanity, as a whole, is given to checking progress definitely by signs and symbols. Except in health. When it comes to health—to the power back of every other success in life—he gambles! He senses his health grade "B—" by various attacks of pain or inability to check out his full day's accustomed work. Loving life and all it means, he goes carelessly on, even while he knows to a certainty that the minus sign may end in his complete undoing; just as the tousle-headed boy, with his heart in the out of doors, knew that his "B—" in grammar meant trouble ahead. The boy shifted his responsibility, without any qualms, on the old schoolmaster. The man shifts his, without any qualms, on his doctor. That takes care of the downward slope below the safe "B."

What about the upward slope? The boy used to scratch his head lazily when prodded to get out of the "B—" group. Some day he would—maybe. The man when prodded to climb the health slope doesn't even scratch his head. Modesty forced the boy to acknowledge that a few of his acquaintances had some way or other "made an 'A'" in his world of school competition. But the man and woman have not been conscious, until recently, that such a grade existed in their health world. The average—health sufficient to permit one to say he was "well" or "well

except for"—has meant for ages all there was in health for the great majority of the human race. Slowly, here and there, an individual is facing about on the level stretch of average health, turning his back on the minus sign, dropping the defensive or preventive attitude of mind, and beginning to wonder whether that far-off summit of "Health A" may not be within his possibilities.

However, the simple fact that men and women have become conscious that there are possibilities in health development is a significant advance. A man has to recognize that a mine has resources before he becomes interested enough to develop it. He would be a shiftless sort indeed if he had samples of the ore in front of him, money to develop the mine, and still sat down indifferently—lazily—waiting until he was crippled financially before he started to work the mine. But why push the point. Individual responsibility is the key to individual achievement. The extent to which one assumes that responsibility is the extent of one's desires to achieve.

The wise man measures the expectancy of returns on his investment by his present assets and available resources. In order to know these accurately he checks up on them. The same process is not only desirable but obligatory if one is to measure his health expectancy. Therefore the health examination is the first common sense step in deciding on one's assets for health development.¹ Any examination to determine mental progress incorporates in it the possibility of testing soundness in the "Three R's." If one is lacking in these, he needs coaching before positive advance can be made. The same is true of the health examination. Certain parts of an ex-

¹ See "Personal Hygiene: The Rules for Right Living," by A. J. McLaughlin, M. D., in the National Health Series.

amination blank are given over to determining whether the individual is sound enough physically and mentally to go on without the constant care of the physician. If disease exists, no one is. If disease does not exist, every one is.

HEALTH EXAMINATION BLANK—MEDICAL

No.
 Date
 Name Age S. M. W. Children L. D. Misc
 Address Birthplace
 Education: School College Normal Special
 Health—Contrast with 1 yr. ago Wt. Gaining Losing Stationary
 Occupation Congenial

Disease Incidence

Family: Cancer Tbc Mental Nephritis Diabetes
 Personal: Scarlet Tonsillitis Chorea Ac. Rheu. Bone & Joint Pain
 Bronchitis Pneu. Influenza Diphtheria Typhoid
 Ear conditions Other Illness
 Operations Accidents

Condition During Past Year

Headache Dyspnoea Dizziness Pain
 Frequent Colds Palpitation Indigestion Fatigue
 Cough Fainting Swelling Overwork

Acute Condition

Eyes Glasses For Reading Constantly Date of last Exam
 Teeth: Visits to Dentist: Regular How often Date of last Visit
 Was an x-ray taken Brushed Times a day What Used Floss Pyorrhea
 Bathing: Cold When taken How often Warm When taken How often
 Diet: Meals at home Self Prepared Cafeteria Restaurant Boarding House
 Appetite Green leaf veg. times a day Meat Water glasses a day
 Three Meals Potatoes Desserts Milk glasses a day
 Eaten Hastily Other Root Candies Tea cups a day
 Betw. Meals Fruits Ice Cream Coffee cups a day
 Special Likes Special Dislikes
 Elimination: Frequent Urination Night Dysuria
 Bowels: Twice daily Once Constipation Diarrhoea
 Regulated by Diet Water Drinking Special Exercises
 Laxative Habit What How Often Enemata
 Menstruation: Began yrs Regular Interval Menopause
 Flow Time Lost In bed Leucorrhoea
 Cramps Backache When Duration Nausea
 Sleep: No. of Hours Continuous Insomnia Windows Open
 Hours Per Day: Work Study Relaxation Outdoors Active Exercise

HEALTH LEVELS

7

Examination

General Appearance.....TempWt.....Average Wt for height and age....
 Eyes: Conj Pupils react to L....Accom....Strabismus.....Disease.....
 M.M.....Nose.....Tongue.....
 Throat.....Tonsils.....

Teeth: 8 7 6 5 4 3 2 1 1 2 3 4 5 6 7 8 x=unfilled cavity Gums.....
 8 7 6 5 4 3 2 1 1 2 3 4 5 6 7 8 o=not present
 8 7 6 5 4 3 2 1 1 2 3 4 5 6 7 8 -=plate Pyorrhea.....

Ears: Hearing-R.....L.....Wax.....Discharge.....

Thyroid.....Tremor.....Exophthalmos.....

Mammæ.....Retracted Nipples.....Mass.....

Heart; Pulse;

Apex impulse felt.....cm from mid- At Rest.....Rate...Rhythm....
 sternal line After Exercise.....Rate...Rhythm....
 (40 running steps)

Perc.: After 3 min Rest...Rate...Rhythm....
 (Recumbent)

Ausc.: systolic /
 Apex Blood pressure..... diastolic

Base Arteries

Lungs:

Abdomen:

Hernia.....Lymph Nodes.....

Extremities.....Joints.....

Reflexes.....

Varicose Veins.....

Skin.....

Vaginal Examination.....

Rectal Examination.....Hemorrhoids.....

Laboratory Tests Recommended:—

Recommendations

.....M D

Subsequent Visits:

Condition:

1 Official blank of Women's Foundation for Health, 370 Seventh Avenue, New York City.

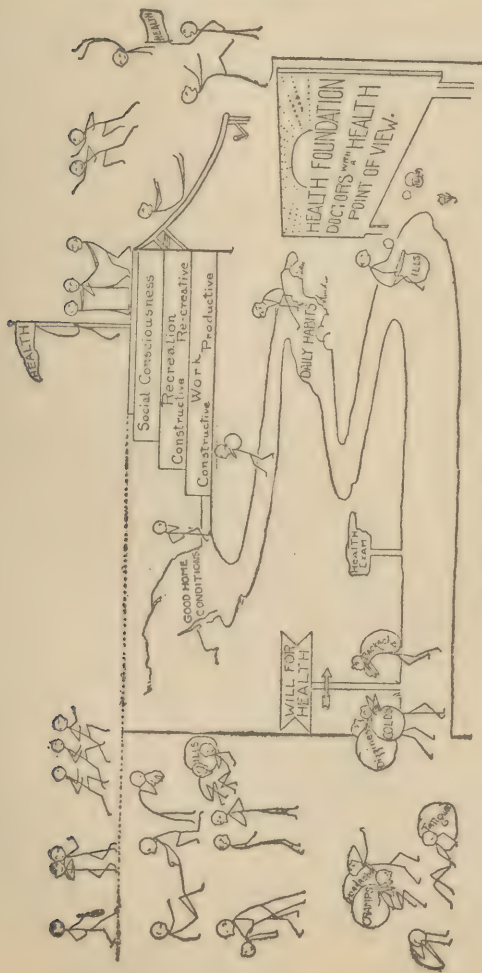
See also Health Examination Blank for general use, prepared by the American Medical Association, Chicago.

CHAPTER II

HEALTH PRESCRIPTIONS

WHAT a man or woman *can* do is by no means a measure of what either *will* do—especially with regard to developing health assets. Health education may reveal the location of the summit of Health Positive. The health examination should show the examinee exactly where he stands on the slope leading to that summit. The health prescription which should accompany every health examination may be in his hands—his own road-map to health. Given the view-point of positive health, any adult will see that the same general directions are given to every adult—"Travel toward the summit." Also any adult will see that the same general stations have to be made by every one.

The whole matter may end there. The individual may settle right down on the stupid rock of indifference and meditate deeply on financial success, on advance in politics, on security of social position—on a thousand and one other things, while health becomes a more remote possibility every second. He may, on the other hand seize that prescription as the talisman which makes the achievement of all other assets a matter of greater ease—or the Open Sesame that glimpses a path more alluring than the present state of mental tension and bodily weariness would even dream existed. In order that this latter possibility may be developed—that the man about to rise from his rock may not sink back discouraged through lack of information—the women of the land, with their usual regard for the health



A Health Pilgrimage
(From Poster No. 3: Women's Foundation for Health.)

of the family and of the race, have set up the following objectives with the steps leading to them, and are broadcasting the necessary directions and educational material through the Women's Foundation for Health.

OBJECTIVES¹

I

To establish the conviction that health is generally attainable through individual effort and responsibility.

II

To establish the conviction that mental health is as procurable as physical health.

PROGRAM

A. For realization of Objective I:

1. Promotion of the positive view-point toward health education and the individual's assumption of her own responsibility.
2. Effort to secure, generally, health examinations:
 - a. First, for inventory of individual needs and advice concerning daily health habits, exercise, and recreation to meet those needs.
 - b. Later, at periodic intervals, for checking improvement and for further advice for development.
3. Promotion of education in the health values of food.
4. Dissemination of adequate knowledge of the heritage of life.
5. Effort to secure proportionate emphasis on the adaptation of recreation to the individual needs.
6. Campaigns on
 - a. Better air—Better Health
 - b. Better food—Better Health
 - c. Better teeth—Better Health
 - d. Correct Posture—Better Health
 - e. Better feet—Better Health
 1. Good Shoes—Better Feet, Better Health.
 2. Straight Foot Walking—Better Feet, Better Health.
 - f. Etc., Etc.

¹ From Leaflet No. 1, Women's Foundation for Health.

B. For realization of Objective II:

1. Effort to secure on the part of the individual correct mental habits.
2. Effort to secure realization of the necessity of adjustment of work, living conditions, and recreation to the individual's physical and mental capacity.

But alas and alack! The immediate urge to be up and about the business of developing health and to continue in it is not easy to find. Naturally we eat because we are hungry; we sleep because weariness overtakes us; we even take a vacation, maybe once a year, because the desire for a change becomes imperative. All we need, then, under diet, sleep, and recreation, is to modify or increase the urge and to distribute its satisfaction according to the needs of our own physical and mental selves.

But—exercise! When it comes to that portion of the prescription, we often get the suspended voice, the rising inflection, or an indignant defence based on the evidence that the examinee has all the exercise he can stand in the usual day's work. The child will exercise. His abundance of vitality must find a proper outlet or there is trouble in the family. The youth will exercise. His abundance of vitality must find a proper outlet or there is trouble in society. But some place along the years of adult life, men and women are likely to force all of this vitality into certain narrow grooves—grooves which twist and turn it into a colorless supply of smoldering fuel for feeding the fires of our adult activities. All spontaneous flame is gone. This adult does not feel the desire to exercise because he has pressed that desire into other service. He has robbed Peter to pay Paul—the Paul of daily adult demand of modern life which tends to “cabin, crib, confine” all natural expression of strength in order to increase the output required by the civilization of to-day. Summed up,

the situation stands thus: children and youth have a natural urge for physical expression which can be molded into habit for life but which, if not so molded, goes the way of many other desirable things of youth. With the urge gone, exercise becomes an irksome task, and, because the adult is his own master, he does not always whip himself into line to perform the task.

Unlike many other lost things of youth, this urge may be revived and may become a vital demand of body and mind. Since it is a necessary ingredient of any and all health prescriptions, it should be revived. Health does not belong to any age alone but is a blessing that may be found any place along the years from childhood to, and past, the four score and ten years of our allotted span. Exercises for health are aides to that blessing—substantial props, in fact, which should be set up early and should be made secure by habit. If not, the prop should be spliced in. Splicing is a mean job, but it is often imperative when undue wear produces a weakness. Because of this peculiarity of man with regard to exercise—exercise for health—not exercise for the athlete alone, not exercise for the sportsman alone, not exercise to reduce alone, or to relax, but exercise for health—it seems well to meditate upon an analysis of general needs, of certain common running expenses in exercise, and then to consider specific needs and to prescribe accordingly.

CHAPTER III

EXERCISE A COMMON PRIVILEGE

THE average man considers exercise a duty and not a privilege. To increase the difficulty he considers it a duty whose performance is his own business alone, since he is to reap the chief benefit in its performance. Therefore, he shifts it, reduces it to meet his convenience, or drops it altogether. That individual needs a new viewpoint. He might get it by riding, to-day, with an engineer whose engine—clean, well-oiled, well-stocked with good fuel—leaps responsively to the engineer's hand, alive to every demand, as vibrant and reliable on the up-grade, as it is on the level stretch. He might get it by riding, to-morrow, with an engineer whose engine—rusty in parts from standing unused in the round-house, from running only on level stretches, dirty, poorly oiled, and stocked with a poor grade of coal—talks back to the engineer in screeching brakes and ugly grating wheels. The first driver felt his engine a part of himself and had a keen satisfaction in the sensation; that man trades off a good part of his day to retain the pleasure of that sensation. The driver of to-morrow feels his engine an alien, a revolting machine, which demands a good part of his day in patching up breaks and paying for them.

Why not make the body a joint partner in the joy of living, just as the first engineer made his engine a joint partner in the day's run? After a time keen satisfaction will come from the sensation of a body that is alive, vibrant, and reliable under stress of unusual burdens, a sensation that creates a desire

for expression in exercise. When that sensation is felt, exercise will become a privilege.

In the meantime the man who needs a new viewpoint has to begin. So does the woman. Each has needs indicated on his or her individual health-examination blanks—needs that account for the revolt expressed through sore muscles, aching back, headaches, a miserable indigestion—through a thousand ills that flesh is heir to, because of a partly unused, undernourished muscular system. Rather uniform revolts, but not necessarily calling for uniform prescriptions even in exercise. In short, the individual soon learns that the old idea of any exercise being good for anybody is a wrong idea. But he learns with equal promptness that some sort of exercise is good for everybody. Nobody escapes. No matter how well he is, no matter how tired he is, no matter how occupied he is, the examinee finds exercise listed in his health prescription. Even a weak or irregular heart does not excuse him. There was a day when the boy, or more particularly the girl, hailed this as a possibility of relief from gymnasium classes. To-day such an excuse merely leads to added attention in selecting exercise of the skeletal muscles of the body; exercises that will develop the weak heart into a strong one fit to carry the girl up a hill with ease and to land her on the top breathing naturally. To be sure, such a case needs careful direction. The girl can not be turned loose to fight out her own salvation, as many can. But neither can she be left to hide behind a weakness that should be made a strength.¹

If a weak heart will not excuse one from exercise, surely nothing will. Certain minimum requirements are necessary for the upkeep of anybody—food,

¹ "Individual Exercises Illustrated," Compiled by Jane Bellows, The Woman's Press.

water, elimination, sleep, exercise. We yield the first four at once. Suppose we include the last—even if we do it grudgingly. Dr. Jesse Feiring Williams, Associate Professor of Physical Education, Teachers' College, Columbia University, writes in his book "Personal Hygiene Applied": "Certainly all men require a minimum physical development which would enable them to participate with pleasure in many forms of motor recreation. The narrow view that conceives man as giving all to vocation and only a pittance to recreation for 'exercise' constricts the range and scope of human happiness.

"This minimum physical development should provide for all:

1. Strength of trunk muscles to maintain an upright posture and to prevent any ptosis of vital organs.
2. Strength of back and leg and feet muscles to produce:
 - a. Ease and elasticity of gait.
 - b. Power for walking, running, and jumping.
3. Strength of arm and shoulder muscles sufficient to swing with reasonable skill a golf club, ax, or racquet, to throw a ball, to row a boat or to paddle a canoe, to pull a rope, to control a horse, and to swim. Strength and skill should be sufficient to permit one to enjoy and to take satisfaction in such activities.

"Such a minimum, tho generally stated, would provide power for enjoyable motor activity. It would insure against the ptoses of adult life. It would tend to maintain at normal the vital organs of the body."

Dr. Ward Crampton sets up the minimum muscular requirements as follows:

"The most important muscles are those which aid life processes. They develop health and organic power.

(1) *Neck Muscles*—Strong enough to hold the head erect, facing the whole world through the long day. *The High Head.*

(2) *Abdominal Muscles*—Strong enough to keep the organs from slumping and weakly bulging. *The Flat Waist.*

(3) *Heart and Blood-Vessel Muscles*—Trained by exercise adequately to carry through a day's work, the week-end play, and to meet all emergencies of strain and illness. *The Uncarying Heart.*

(4) *Arm, Leg, and Trunk Muscles*—Strong enough to do work efficiently, to walk, hike, and play for health and enjoyment, with vigor and enthusiasm. *The Able Reliable Limbs."*

How many can claim this minimum development? Even the man sitting on the rock of stupid indifference has to confess that his proportion is not satisfactory. The trend of to-day's civilization piles up odds against increasing that proportion. Science is gradually easing the backs, the arms, the legs of men from the labor of yesterday. Deftness of some parts of the body is exchanged for disuse of all the other parts—and for an increase in wages. If the man wants to keep his body from deterioration under civilization he must exercise to counteract the neglect a machine-age brings upon that body.

That neglect does not affect the muscular system alone; the exercise to remedy that neglect does not benefit that system alone. To the thrifty individual the fact that he may be getting a double return may be an added inducement for him to enter the game of development. The muscular system is, of course,

the prime beneficiary in the undertaking, but there are others. Through the proper activity, circulation increases and acts more effectively, both as a remover of waste and as a distributor of food to the tissues of the body. Respiration increases and, with the increase, added oxygen enters the lungs and carbon dioxid is more rapidly eliminated. The skin, intestines, and kidneys become more active in their function of elimination. Food has a better chance of easy digestion and complete assimilation. Surely a fair barter.

Another thing to tip the scales in the favor of adequate exercise is that the individual will find his health prescription advises making it, as far as possible, a natural outgrowth of the day's activity. He does not have to go to a gymnasium; he does not have to add it to his day's program—not all of it, at least. He is taught to incorporate it automatically in that program. For example, one of the best breathing exercises is taken while one is sleeping in a proper position in the out-of-doors; or, if that is not possible, in a room with the windows wide open. Another equally good one comes, without extra expenditure of time, while walking erect, shoulders straight, and breathing evenly and easily. Walking at a good swinging gait with the body held in a correct position—consciously held so until that position becomes natural—to and from work, in groups or alone; playing ball; chopping wood; all are exercise just as surely prescribed and often more surely than the formal group-exercise of the gymnasium. In fact, the formal group-work may not be what your particular body demands, and the wood chopping may be. There can be no choice—if wood chopping is better, then wood chopping it should be.

The individual who needs the new view-point has to begin. We said that some time ago. He has been

told that he can not get any distance in his physical betterment without exercise; that he should not look upon it as a duty, but should really train himself into an appetite for it; that he can coax himself into the first effort by contemplating the odds against him in this machine-age and by playing the game of counteracting those odds by making exercise grow out of his day; he has been brought face to face with what a minimum physical development should provide for him, and has found that he is woefully lacking. All of this by way of persuasion. And yet the chances are that he will turn his back when told that he should spend an hour a day in vigorous exercise. However, in order that he may find no excuse; that he may know "what," as well as "when" and "why," the following general plan is submitted to him for his day. Try it for ninety days. Stop arguments. Give yourself a chance. If you are an "A" in health, keep your place until you die of physiological old age. If you are a "B"—"A" is ahead of you! "Getting by" your doctor, your family, your own best judgment, does not add one whit to your life's assets. Try the following for ninety days, and count the gain.

A DAY'S MINIMUM OF EXERCISE

I

How to Start the Day

Getting-Up Exercises.....	10 minutes
Cold Bath	
Morning Walk.....	15 "

II

How to Keep Up Speed Through the Day

Pepping-Up or Relaxing:

Middle of morning and afternoon.....	3 minutes
Noon Walk	10 "

III

How to End the Day

Evening Walk.....	15	“
Going-to-Bed Exercise.....	10	“

The trouble with the Getting-Up-Exercises is that few people want to get up to begin with, and therefore are in no mood, mentally or physically, to violate their comfortable morning sleepiness by throwing themselves into a sudden mid-day activity. There are ways, however, of approaching the day's activities through morning exercises which come in a natural, sensible sequence, paralleling one's waking stages.

Even such a rational proposal will find constitutional objectors, because there are individuals who always see the first light of their day obscured by a deep purple gloom. To make matters worse these people want to be miserable—believe, in fact, that it is a sign of superior temperamental mood to have life take on a somber tint the first thing in the morning. The fellow who is cheerful at dawn—especially if he is noisily cheerful—is considered by such persons as rather lacking in mental ability; certainly he is of a coarser clay, and hasn't much spirit to accept his getting-up as a joy. Far be it from us to lift the lid either of the night before or the day before of the man who awakens up in this deep sulfuric gloom. But any one who dares do so would find all sorts of miserable, scampering sins of omission and commission playing fast and loose with diet, activity, and rest. But yesterday is yesterday, and what is more to the point last night is last night. Ninety days from now there won't be such a possibility—not if you begin the game of real living immediately.

Begin, for instance, with abolishing the idea that

waking exercise must be at variance with your mood. Be lazy—as lazy as you want to be in the beginning. Try these:

Getting-Up Exercises

¹ Yawn deeply.....	4	times
¹ Stretch every inch of your body.....	4	"
Turn with a flounce.....	2	"
Hands—grip and relax.....	4	"
Flex feet.....	4	"
Toe grip.....	4	"

and then to the bath room, start the cold tub, empty the urinary bladder, and you are ready for:



PUMPING

Lie on back with knees bent, feet resting on floor; inhale and lift the upper abdomen; exhale and relax. To localize, lay hand lightly on upper abdomen just below the subcostal angle, making quick breath intake and upward movement.²



BICYCLING

Lying, bend and extend knees alternately as in paddling motion on bicycle, making circles in the air with the foot and leg. Continue rhythmically 10 times.²

Before you know it you are out in the middle of the floor again. What has happened? The muscles of the neck, trunk, diaphragm, abdomen, the arms, legs, hands, and feet have each been contracted, with the result that the lungs are filled with fresh air—provided that your windows have been wide open

¹ "Physical Exercises for Daily Use;" by C. Ward Crampton, Putnam.

² From Pamphlet One, Positive Health Series, Women's Foundation for Health.

through the night—the blood is flushing the body, and the muscles of the abdominal walls have been massaged.

What next? Continue the good work with a fair distribution of the following exercises, according to your needs. (Illustrations taken from Pamphlet One, Positive Health Series, Women's Foundation for Health.)



ROCKETS

Stand, bend and stretch arms upward quickly, and follow with slow sinking sideways downward. Continue 10 times.



RAISING FLAG

Stand, right arm extended upward as if grasping rope, left arm in front of waist. Pull down with right hand, bending knees. Grasp rope left hand, straighten knees. Repeat 10 to 20 times.



FOOT ROLLING OUTWARD

Stand, feet parallel; raise inner border up and out, knees held straight, toes touching floor; 20 to 30 times.

By this time the mental clouds have retreated and are banked up on the horizon in a last sullen heap.



HORSESHOE BEND

Stand with feet wide apart. Swing right arm sideways upward and at the same time bend body to left. Same to right, changing positions of hands. Continue alternating, left and right, 6 to 10 times.



FOOT CIRCLING

Sit, with right leg crossed over left knee; make circle outward with right foot *up*, out, down, *in*, up. Make strong effort on "in" and "up" and relax on "out" and "down." Repeat left; 30 to 40 times.



JACK-KNIFE DIVE

Stand, try to touch the floor by bending sharply at hips, with straight upper back. Straighten up with arms over head. Lower arm sideways downward. In groups of 6, 12 to 18 times.

The blood is tingling. The muscles are in tune to start the day. The vital organs are behaving well,

or as well as they can in view of possible past neglect, poor fuel, under rest, and overwork.

The last—Walking with Foot Gripping—should land you in your cold bath. But forty-nine varieties of alibies are produced for this part of the program. And yet the outburst, "I feel like a million dollars,"



WALKING WITH FOOT GRIPPING

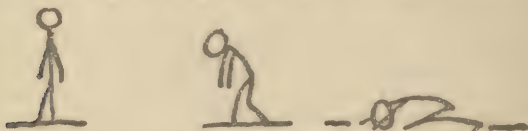
Step forward a short step out with right foot, grip with right foot, advance left foot, grip with left; progress forward, gripping with foot after weight has been transferred to it. Toe straight ahead in walking.

comes more often after a cold bath and rub or after a swim than after any other one form of physical activity. By the way, the cold bath and the rub are the skin's best and practically only chance to exercise. It is a natural instinct to want to save one's skin. Think of the cold bath in that connection.

Any man or woman ought to be ready for a real breakfast at this stage of the program; also, ready for a fifteen minute walk immediately after—a walk which carries the body with easy swinging strides, trunk erect, shoulders straight, head held high—a walk of measured strides which leads to deep regular breathing—a walk which stimulates the mind by leading it to consider other interests than those confined to work or home. At the end of the fifteen minutes the last vestige of purple cloud has dropped

below the mental sky-line of the exclusive individual who got out of the wrong side of his bed.

The protests that arose over the cold bath are but a faint echo to those that greet the suggestion of a mid-morning and mid-afternoon three minute relief from the day's pressure; but protests or no protests, the need is imperative—imperative from the standpoint of your own productive possibilities in business circles, or from the standpoint of your leadership in social circles. Distribute them, if three minutes upsets the machinery. Take a minute now and another later; only let loose entirely, in order that you may begin again with greater surety and ease. If you are sitting at your desk for hours, the Drooping Daisy is a good thing for you to consider.



DROOPING DAISY

Stand up at ease with left foot slightly advanced. Droop forward, beginning with hips and knees, then back and head, letting weight carry body forward until individual lies in crumpled heap on floor. Return by reverse process until upright position is assumed; finish with head dropping backward, elbows, wrists, and hands reaching upward relaxed, swaying from side to side. Repeat 3 to 6 times.¹

On the other hand, the man or woman who stands all day in a shop or factory, who hurries about the house, or tramps across fields, needs to sit down, or lie down, for several minutes in the middle of the half day—needs to close the eyes and to let go the day's grip for the sake of the mind and spirit, as well as for the sake of bodily relaxation.

The noon walk, like the morning and evening

¹ From Pamphlet One, Positive Health Series, Women's Foundation for Health.

walk, should be taken with health consciously in mind until the correct posture, the correct breathing, and the correct mental attitude become a part of the walk; and the slouching gait, the slumping shoulders, the protruding abdomen go the way of the other sins of that yesterday which certainly did not add to a convincing personality.

The day rounds out with exercise and bathing. The exercise this time, as in the morning, should grow out of the needs. The day is over. A healthy tired should be the natural condition. Exercises that relax and loosen up the whole body are the only ones that bedtime will accept. (Illustrations from Pamphlet One, Positive Health Series, Women's Foundation for Health.)



CAT WALK

Relax head, back, and knees; come to stoop-standing position on all fours with palms on the floor. Advance with arm and right foot until left knee is straight, keeping left hand on the floor. Repeat, advancing in the same way with left foot and arm, keeping right hand on floor, lifting the whole body in moving forward. The body should not be tense, but should advance after the manner of a cat.



WAVING WILLOWS

Stand with left foot in advance of right foot. Relax back, arm, head, and knees completely. Swing the body to the right, keeping arms parallel and relaxed. Bring them, with the body, in a circle upward to the right, and downward in a circle to the left. Keep the body relaxed during the entire movement; 2 to 6 times.



CIRCLING

Sit on chair in easy position, make circles with the head, starting left. Make five complete circles to the left and then rest. Repeat circles to right. Continue alternating left and right, 20 to 30 times.

The warm, soapy bath finishes the relaxation and sends the body to bed comfortably grateful for the care. Providing a full work-out is taken two or three times a week, this program should be the minimum for every day. Otherwise the full realization of the body's possibilities is still unfulfilled. This work-out may be found in bowling, tennis, hockey, baseball, swimming, or folk dancing; but, whatever form it takes, it should be vigorous enough to produce physically a free perspiration, and mentally and spiritually a satisfaction that can only come from the give and take of a rattling good game.

Any adult holding a health examination blank that shows he is free from disease can use this ninety-day program as a standard and incorporate the work-out as his community permits. But nobody is eligible to begin the program until he does hold that blank, and nobody should begin until his own physician, who has given him the examination, writes out a health prescription which tells him whether this is all he needs; whether he shall supplant here, add there, and so fit his day's program to his *own* needs; whether he can go his way alone, or whether he must learn the technique of his individual exercise from a director of physical education, just as a patient under the physician's care may need, for a time, the nurse to interpret that care.

CHAPTER IV

EXERCISE FOR TYPES AND OCCUPATIONS

ANY man likes to be the center of attention. So does any woman. That has been one reason for the lack of responsibility assumed by the individual for his own health. Generally speaking, everybody's health affairs are at loose ends. That gives the coldly, self-assured, self-reliant individual and the irresponsible dependent one a common weakness to be worried about; gives every human being a possibility of being pampered. And everybody likes it more or less—many times more than less. That is the reason the woman of our story in the first chapter would rather pay the doctor twenty-five dollars to have him worry than to be sensible and assume the responsibility of her own health.

No one member of society knows this common desire for attention so well as the physician. No one has responded to it more readily through all of the past centuries. Nobody knows better than he does right now that even tho the individual must assume the responsibility for following the directions on his card, these directions must come from him or from some one associated with him—his nurse or director of physical education. And they must be specific directions to suit the individual—directions that take into account the type of man or women the examinee is, and the occupation, home, and social relations of each. Therefore, the individual is assured that, altho he is being thrown out on his own responsibility, the physician starts him right and no doubt watches him from a distance with

considerable pride and much understanding. Such interest ought to satisfy a person. But the fact that he is still further singled out for attention, that his health is peculiar to him and demands particular attention, that his diet list is made out for him, that his needs for recreation are studied and carefully met, that his exercises are meant for his special development—well, any sensible person ought to be satisfied with that attention. Before to-day, he has had a brief specialization of his needs when sick until the days of convalescence led to the days of cure. To-day the specialization continues through the years, with a periodical checking of his health advance. Instead of competing with disease, he is now competing with health—his health of this year as against his health of last. His own health. Not the health of neighbor Jones. Not the exercise of neighbor Jones. His own exercise. To be sure there are certain exercises he may take that his neighbor takes, just as he may take the cough syrup that his neighbor takes. But there may be things that would be better for him than the cough syrup, if he but investigated the matter.

If he is the man who sits heavily on his work bench all day patching other men's shoes; if he is the man who sits heavily in an office chair patching up other men's affairs; if he is the same heavy type who sinks solidly into his shoes, sagging solidly throughout his whole physical make-up as he stands in the factory, mechanically sorting this, assembling that, manipulating delicate machinery—if he is any one of these, he needs a set of exercises to counteract the inactivity of certain parts of his body, and at the same time exercises that take into consideration the fact that he is overweight. On the other hand, if he is the thin, wiry type of man who sits tensely on a factory stool doing just what the over-

weight does, or if he stands by the side of his stout neighbor in the same factory, he needs a varying prescription to meet both his type requirement and to counteract the restrictions his occupation places upon him.

And the woman! Everything that is said about the man can be said about her, plus additions to meet her particular physical make-up and to fit her for her particular responsibilities. In all probability she will be so busy seeing that the man of the family follows the directions on his card that she will forget where she put hers when she gets around to study it. If there is no man in her family she will have to adjust herself to that before she can pull her own health development into the foreground of her activities. There are centuries of self-effacement in health behind the woman which make her slow to realize that her card demands the same literal interpretation as the man's.

All of which leads us to conclude that, man or woman, stout or thin, sitting, standing, or walking in the day's work, mentally occupied, physically occupied, or not occupied at all, no two human beings are entirely alike in their response to demands, but all have some portion of their body that remains inactive in the day's routine. Therefore, it is obvious that just as surely as everybody must exercise, so must everybody exercise for his own individual needs.

INDIVIDUAL EXERCISES FOR INDIVIDUAL TYPES AND OCCUPATIONS

Exercise to music and enjoy every moment. Music—any good waltz.

[Taken from Pamphlet One, Positive Health Series, Women's Foundation for Health.]

GENERAL DAILY EXERCISES FOR INDIVIDUALS IN CLASS A.

Those who are 100 per cent. fit and want to keep in that class.



FLEXION AND EXTENSION

Lie on back with arms bent loosely at sides, palms closed; bend right knee to chest and swing arms sideways at same time, opening palms and stretching fingers. Bend arms and extend knee, returning foot to starting position. Repeat left; continue alternating right and left, 20 to 40 times.



ROCKETS

Stand, bend and stretch arms upward quickly, and follow with slow sinking sideways downward. Continue 10 to 20 times.



RAISING FLAG

Stand, right arm extended upward as if grasping rope. Left arm in front of waist. Pull down with right hand, bending knees. Grasp rope left hand, straighten knees. Repeat 10 to 20 times.



FOOT ROLLING OUTWARD

Stand, feet parallel; raise inner border up and out, knees held straight, toes touching floor; 20 to 30 times.



HORSESHOE BEND

Stand with feet wide apart. Swing right arm sideways upward and at the same time bend body to left. Same to right, changing positions of hands. Continue alternating, left and right, 6 to 10 times.



BICYCLING

Lying, bend and extend knees alternately as in paddling motion on bicycle, making circles in the air with the foot and leg. Continue rhythmically in 10's, 30 to 40 times.



FOOT CIRCLING

Sit, with right leg crossed over left knee; make circles outward with right foot *up*, out, down, *in*, up. Make strong effort on "in" and "up" and relax on "out" and "down." Repeat left; 30 to 40 times



JACK-KNIFE DIVE

Stand; try to touch the floor by bending forward sharply at hips, with straight upper back. Straighten up with arms over head. Lower arm sideways downward, 12 to 20 times, groups of 6's.



CONTRACTION

Lying, knees bent, flatten abdomen with strong muscular contractions. Lift chest at same time. Contract on inhalations, 10 to 20 times.



WALKING WITH FOOT GRIPPING

Step forward a short step out with right foot, grip with right foot, advance left foot, grip with left; progress forward, gripping with foot after weight has been transferred to it. Toe straight ahead in walking.

EXERCISES FOR PEOPLE WHO *STAND* AT WORK

Stout Type. Overweight.—General Exercises.



FLEXION AND EXTENSION

Lie on back with arms bent loosely at sides; bend right knee to chest and fling arms sideways at same time, stretching fingers. Bend arms and extend knee, returning foot to starting position. Repeat left. Continue alternating right and left until tired; rest and repeat.



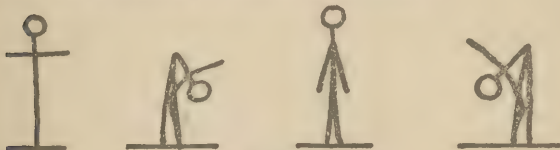
CONTRACTION

Lying, knees bent, flatten abdomen with strong muscular contractions. Lift chest at same time. Contract on inhalations, 10 to 20 times.



SWINGING

Lie on back with knees bent to chest, feet crossed, and arms extended relaxed at shoulder level; swing knees sideways to touch floor; alternately right and left. Vigorous swinging causes the body to progress on the mat; 30 to 40 times.



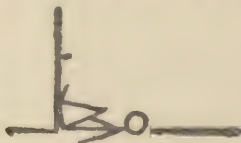
WEAVING

Stand with feet parallel and apart; raise arms sideways to shoulder level; bend and twist forward downward to left until right hand touches left foot. (Keep left arm at shoulder level.) Return to upright position; lower arms to sides. Repeat to right; continue alternately left and right, 12 to 20 times.



TREADING

Kneel on floor, with head resting on arms folded on floor; stretch right foot back as far as possible until knee is straight, letting back sag down. Return right knee to bent position under abdomen. Repeat left; continue 10 to 50 times.



WALL BICYCLING

Lie on mat or floor with buttocks touching wall and both legs resting upright against wall, trunk relaxed, arms loosely extended over head, resting on mat. Bend left knee, letting foot slide down wall, weight of leg carrying knee to rest against abdomen and chest. Extend left knee forcibly, pushing foot up wall, heel leading, until back of knee is flat against wall. At end of push, foot should be in position of dorsal flexion, i. e., bent toward face. As left leg extends, allow right knee to bend. Continue alternately and rhythmically (vigorously but not jerkily); make strongest effort on upward thrust of heel, opposite leg being relaxed in its downward movement. Repeat until tired.

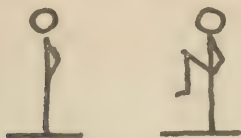
EXERCISES FOR PEOPLE WHO SIT AT WORK

Stout Type. Overweight. General Exercises



JACK-KNIFE DIVE

Stand; try to touch the floor by bending forward sharply at hips, with straight upper back. Straighten up with arms over head. Lower arm sideways downward, 12 to 20 times, groups of 6's.



BENDING

Stand with hands on hips; bend left knee up quickly and replace, keeping trunk erect; repeat right. Continue alternately in quick time, 20 to 40 times.



ROOSTER

Stand, arms in bent position, hands at shoulders, elbows touching sides; raise elbows with backward movement of head and heel raising. Continue 10 to 20 times.



FLINGING

Stand, hands on hips; fling left leg straight to side and back to original position. Repeat right. Continue alternately left and right, 10 to 20 times.



BICYCLING

Lying, bend and extend knees alternately as in paddling motion on bicycle, making circles in the air with the foot and leg. Continue rhythmically in 10's, 30 to 40 times.



CAT WALK

Relax head, back and knees, and come to stoop-standing position with palms on the floor. Advance with right arm and right foot until left knee is straight, keeping left hand on the floor. Repeat, advancing the same way with left foot and left arm, keeping right hand on floor, lifting the whole body in moving forward. The body should not be tense, but should advance after the manner of a cat, 12 to 20 times.

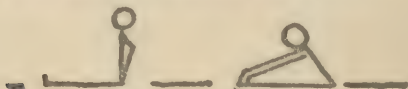
EXERCISES FOR PEOPLE WHO STAND AT WORK

Thin Type. Underweight.—General Exercises.



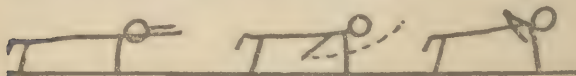
ROCKING HORSE

Kneel on floor; bend forward until chest nearly touches knees, arms stretched forward, hands resting on floor, shoulder-distance apart. Swing body forward and down to floor, straightening knees and bending elbows. Return to starting position. Repeat, swinging easily forward and back, 10 to 15 times.



TOUCHING TOES

Sit on floor with knees out straight and hands at sides. Swing arms sideways upward over head and then touch toes; return to position in reverse order, 6 to 10 times.



SWIMMING

Lying prone on bench or box, stretch arms forward, thumbs locked, hands turned back to back; move arms backward as in swimming; bend them across the chest, elbows close to side, 6 to 12 times.



CIRCLING

Sit beside bench or chair, hands on thighs. Bend trunk forward to horizontal, back flat; move trunk to left, upward to right, downward, making circle (avoid going backward of the vertical in coming up). In 3's, 6 to 12 times.



SQUEEZE

Kneel; sit on floor to left of knees, clasping hands back of head, or merely touching fingers. Bend to right side, touching floor with elbow. Same to opposite side, in groups of 3's, 10 to 12 times.



WALL BICYCLING

Lie on mat or floor with buttocks touching wall and both legs rising upright against wall, trunk relaxed, arms loosely extended over head, resting on mat. Bend left knee, letting foot slide down wall, weight of leg carrying knee to rest against abdomen and chest. Extend left knee forcibly, pushing foot up wall, heel leading, until back of knee is flat against wall. At end of push, foot should be in position of dorsal flexion, i. e., bent toward face. As left leg extends, allow right knee to bend. Continue alternately and rhythmically (vigorously but not jerkily); make strongest effort on upward thrust of heel, opposite leg being relaxed in its downward movement. Repeat until tired.

EXERCISES FOR PEOPLE WHO SIT AT WORK

Thin Type. Underweight.—General Exercises.



ROCKETS

Stand, bend and stretch arms upward quickly, and follow with slow sinking sideways downward. Continue 10 to 20 times.



BENDING

Stand, with arms hanging at sides (or hands on hips), feet parallel, toes pointing forward; bend left knee quickly to chest. Replace and bend right knee. Continue alternately left and right, 10 to 30 times.



BICYCLING

Lying, bend and extend knees alternately as in paddling motion on bicycle, making circles in the air with the foot and leg. continue rhythmically in 10's, 30 to 40 times.



CLAPPING

Stand with feet apart; bend forward, clapping hands under left knee, and return to erect position. Repeat to right and return; then touch floor between feet and return. Continue as a six-count exercise, 8 to 16 times.



CIRCLING

Stand with hands on hips; circle trunk to left and down, then to right, making a complete circle. Continue 5 times without stopping. Repeat circling to right. Repeat alternately, 10 to 20 times.

CHAPTER V

INTERNAL CLEANLINESS

THE average individual is far from consistent when it comes to living in a manner to keep his body running by natural means. Too many consider it easier to place a quarter on the drug-store counter for a box of pills, than to take the responsibility of cooperating with nature. If the quarter is all the man pays, he might run the risk of that expense. But the very fact that he has to pay that, or thinks he has to, proves that he is running up an account with nature, which promises to attack and deplete his physical and mental assets and possibly, quite possibly, his financial assets. What costs most in wear and tear of the body? Eating correctly, drinking sufficient water, exercising properly, resting adequately, observing health habits; or, eating recklessly, drinking scantily of water, omitting all exercise or exercising unintelligently, paying no attention to health habits, and taking a pill at bedtime?

If the former is done consistently, the chances are nine to one that the individual will never be called upon to spend his quarter and that the investment in proper living will increase his health assets to assure years of comfort, otherwise impossible in quantity or quality. On the other hand, health statisticians pile up the perils of the other kind of living until one marvels at the temerity of the mass who dare incur them. If the stagnating refuse in the intestines meant only local discomfort or brought

only the immediate results of sick headache, dizziness, fatigue, bad breath, poor appetite, stiff neck, mental sluggishness, irritability, anybody would wonder why men and women run the risk of suffering such impairments when it is possible to avoid them in a simple, sane way within the reach of anybody.

Moreover, the story does not end with those immediate results. Health statisticians say that the poisons which constipation accumulates back up through the circulatory system and affect the kidneys, the heart, and the liver. To-day, constipation holds the record of being the chief cause in the development of circulatory diseases which cause more deaths in the United States annually than tuberculosis and cancer combined.¹ It seems a far reach from the first quarter spent for the first box of pills to such a dire conclusion. But facts are stubborn things, and the man who pauses to-day to consider these particular ones certainly can read the "STOP—

Health Examination Blank—Physical

No. Age Date

Name

	1st				2nd				3rd				4th			
	Pts.	Pts.	Pts.	Pts.	Pts.	Pts.	Pts.	Pts.	Pts.	Pts.	Pts.	Pts.	Pts.	Pts.		
Height																
Average weight																
Weight																
*Lung capacity																
*Urine expansion																
At rest																
Forced exp.																
Forced insp.																
Costal angle																
At rest																
Forced exp.																
Forced insp.																
*Muscle strength																
Forearm, R.																
Forearm, L.																
Chest																
Shoulders																
Back																
Legs																
Total																

	Summary			
	1st	2nd	3rd	4th
Date				
Medical points				
Physical points				
Total points				
Grade				
Examiner, medical				
Examiner, physical				

	Exercise and Recreation			
	1st	2nd	3rd	4th
Gymnastics				
Club				
Individual				
Athletics				
Sports				
Dancing				
Walking				
Club				
Theater				
Movies				
Music				
Amateur				
Polio				

*Chest expansion taken only when lung capacity can not be taken.
Lung capacity and muscle strength tests not to be taken until medical examination has been given.

Copyright, 1922, by the Women's Foundation for Health, Inc.

¹ "Physical Exercise for Daily Use," by C. Ward Crampton, M. D., Putnam's.

WATCH—LISTEN" signal of the danger grade. For that man, counting his years in the forties, who probably will never confess to the number of quarters he has passed over the drug counter; for the woman also—emphatically *also*—of the same years and the same reckless expenditure of quarters; for the older man and woman for whom the question of pills is beginning to be an all-absorbing one; for the young man or woman of twenty who considers the discussion of pills in poor taste, but does not hesitate to take them after several days of intestinal stubbornness, to all of them the following are offered to be taken daily with the adequate diet, the water drinking, and the attention to promptness in health habits rather than convenience.

(Following illustrations selected from Pamphlet One, Positive Health Series, Women's Foundation for Health):



BENDING

Stand with hands on hips; bend left knee up quickly and replace, keeping trunk erect; repeat right. Continue alternately in quick time, 20 to 40 times.



BENDING

Lying, bend knee vigorously to chest, right and left alternating quickly, with foot flexed at ankle instead of with the usual ankle extension, 20 to 40 times.



CIRCLING

Stand with hands on hips; bend trunk forward to horizontal, back flat; move trunk to left, upward, to right, and downward, making circle (do not go backward of the vertical in coming up). Continue in 5's, 10 to 20 times.



TREADING

Kneel on floor, with head resting on arms folded on floor; stretch right foot back as far as possible until knee is straight, letting back sag down. Return right knee to bent position under abdomen. Repeat left; continue 10 to 50 times.



DOUBLING OVER

Sit on chair, with feet resting on chair or bench 6 to 12 inches lower, with right arm resting across abdomen, left arm hanging at side. Bend forward quickly, pressing arm into abdomen and keeping knees together, 30 to 40 times.



CIRCLING

Lying, bend knees to chest. Circle legs, keeping knees bent, right and left, in 5's, 10 to 20 times.



CONTRACTION

Lying, knees bent, flatten abdomen with strong muscular contraction, lifting chest at the same time. Inhale on contractions, 10 to 20 times.

CHAPTER VI

STANDING STRAIGHT WITH YOURSELF AND YOUR WORLD

THERE isn't an adult human being who does not desire an appearance of poise and balance, of ease and elasticity. He started right. The backs of nine babies out of ten are straight; his small organs are where they are meant to be. The growing boy and girl slump, perhaps because of too rapid growing; perhaps because of too heavy burdens, perhaps because exercise to counteract shut-in, school-desk days is intermittent, sporadic, insufficient, and, therefore, does not become a daily habit. School life merges into adult life where modern civilization has set up modern machinery, restricting free and useful physical activities.

A trunk that falls in such disrepute must naturally entail a pair of disreputable legs and feet. He who walks most walk best. He who flexes his feet, who uses his arches correctly, who relaxes his toes in regular exercise; he who can swing his legs from the hip, from the knee, who bends them in regular exercise, has certainly a greater chance of laying claim to a distinctive walk—the walk of a leader—than the individual who curls them under a desk or stands tense at a machine six days out of a week without such relaxation.

As was said before, the human being desires the straight back, the easy walk—desires them because of the advantage they give him in looks, and in business competition. But in looking over the mass of men and women going up and down the world, it is

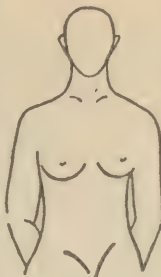
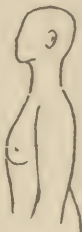
very evident that that desire fails to express itself in the exercise necessary to get the longed-for results. If the additional good looks, ease of manner, and added ease in competitive skill were all that the individual lost by that inactivity, the human race could stand the loss fairly well, so far as public welfare goes. But the man with poor posture, with poor muscle-tone, is the one whose circulation, respiration, elimination, digestion, and nervous system are accumulating liability checks sufficient to render this individual biologically undesirable. Why not clear up the posture record and set yourself straight with the race, and become more livable with yourself?

And when we say "him," we really mean "her." We have meant "her" chiefly all the way through in regard to posture and to cramped walking. With all of her devotion to the family and to the race we wonder why her conscience does not stir up her responsibility for attaining good posture.

Despite the fact that pride of bearing is a deep-seated pride and that the appeal to be a biological asset is a convincing appeal, the slouchy grouchy army of Poor Posture goes marching—shambling, rather—steadily on without any apparent decrease in numbers. Perhaps the man and woman need the whip-hand of fear to sting them into action. They certainly are laying themselves liable to a sufficient list of evils to make that whip the traditional cat-o'-nine-tails. Indigestion, headache, faulty elimination, flabby muscles, mental depression, backache—all track in the wake of poor posture, with the possibilities of any or all of the pathological conditions that may grow up out of such associations tagging persistently in the rear. Before such conditions arise take out your examination blank and see what is said about your posture.

	1st		2nd		3rd		4th	
	R.	L.	R.	L.	R.	L.	R.	L.
Feet:								
Good.....								
Eversion.....								
Pronation.....								
Slight.....								
Marked.....								
Long-arch:								
Good.....								
Exalted.....								
Low.....								
Flat.....								
Tendons:								
Normal.....								
Fair.....								
Poor.....								
Transverse Arch:								
Good.....								
Low.....								
Flat.....								
Bulging.....								
Callous.....								
Toes:								
Good.....								
Strong.....								
Weak.....								
Crowded.....								
Curled.....								
Straight.....								
Bubbled.....								
Great Toe:								
Straight.....								
Joint enlarged..								
Corns:								
Number.....								
Location on top.....								
Between toes.....								
Pain:								
Foot: Long-arch.....								
Trans. arch.....								
Dorsal surr.....								
Plantar surr.....								
Leg: Anterior.....								
Posterior.....								
Abdomen.....								
Back.....								
Neck.....								
Legs:								
Straight.....								
Bowed.....								
Knock-knee.....								
Postural.....								
Total Correction:								
Good.....								
Fair.....								
Poor.....								
Shoes:								
Good.....								
Fair.....								
Poor.....								
Grade:								
Points:								

POSTURE



Remarks:

	1st		2nd		3rd		4th	
	R.	L.	R.	L.	R.	L.	R.	L.
Abdomen:								
SI round.....								
Prominent.....								
Flaccid.....								
Flabby.....								
Sagging.....								
Back:								
Good.....								
Round.....								
Long round.....								
Hollow.....								
Round hollow.....								
Flat.....								
Strong.....								
Weak.....								
Shoulders:								
Good.....								
Forward.....								
Chest:								
Broad.....								
Deep.....								
Flat.....								
Narrow.....								
Forward of abd.....								
Hollow at sh.....								
7th Cervical:								
Good.....								
SI prominent.....								
Prominent.....								
Neck:								
Erect.....								
Forward.....								
Head:								
Erect.....								
Forward.....								
Tipped.....								
Total Displacement:								
Forward.....								
Backward.....								
Lateral.....								
Hips:								
Level.....								
Prominent.....								
Scapulae:								
Good.....								
Prominent.....								
High.....								
Shoulders:								
Level.....								
High.....								
Tense.....								
Pain.....								
Spine:								
Straight.....								
Flex. ant.: Good.....								
Limited.....								
Flex. lateral: Good.....								
Limited.....								
Deviation:								
Total.....								
Cervical.....								
Cervico-dorsal.....								
Dorsal.....								
Dorso-lumbar.....								
Lumbar.....								
Rotation:								
Cervical.....								
Dorsal.....								
Lumbar.....								
Correction:								
Good.....								
Fair.....								
Poor.....								
Grade:								
Points:								

(Physical Examination Blank appears following page 41.)¹



Through permission of Miss Harriet Wilde, Director of Physical Education, New York City.

Whatever you see there may be cleared up according to the measure of your desire. The girl in the illustration came into the office of a New York physi-

¹ Official blanks of Women's Foundation for Health, 370 Seventh Avenue, New York City. See also: Health Examination Blanks, American Medical Association, Chicago.

cian who is specializing in health examinations. She was feeling miserable, tired, mentally depressed, suffering from backache, headache, indigestion. She was given a thorough medical examination and found to be free from any diseased condition. Her physical blank, however, was strewn with checks—and deservedly so, as any one who observes her posture will admit. That was in November. She was put on a health prescription, and, because of her condition, for two months was kept under the supervision of the director of physical education associated with the physician. Proper diet, health habits, rest, fresh air were incorporated in the prescription, together with the following exercises in the order given here, and others similar to them:



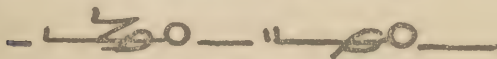
ROCKING HORSE

Kneel on floor; bend forward until chest nearly touches knees, arms stretched forward, hands resting on floor, shoulder distance apart. Swing body forward and down to floor, straightening knees and bending elbows; return to starting position. Repeat, swinging easily forward and back, 10 to 18 times.



RAISING

Lie prone, hands at sides with palms turned out in "West Point" position, face down; lift head and upper back from support. Hold two to three seconds; repeat 5 to 8 times.



BENDING

Lying, bend knees vigorously to chest, right and left, alternating quickly, with foot flexed at ankle instead of with the usual ankle extension. Lay right arm across lower abdomen, make pressure on arm with thigh; as knee bends, the arm presses into the abdomen. In groups of 10, 20 to 30 times.



SWIMMING

Sit cross-legged on floor; stretch arms forward, thumbs locked and hands turned back to back. Move arms backward as in swimming to bend them across the chest, elbows close to sides; 6 to 12 times.



BICYCLING

Lying, bend and extend knees alternately as in paddling motion on bicycle, making circles in the air with the foot and leg. Continue rhythmically in 10's, 30 to 40 times.



CONTRACTION

Lying, knees bent, flatten abdomen with strong muscular contractions. Lift chest at same time. Inhale on contractions, 10 to 20 times.

In January this is the way the girl looked.



Through permission of Miss Harriet Wilde, Director of Physical Education, New York City.

And the way she felt corresponded to her looks—free from the miserable ailments of two months before, vitally alive from head to foot, and looking her world fearlessly in the face with a courage born of a well-poised mind in a well-poised body.

Of course, there may be a man or woman here and there who hasn't even had a health examination! That same man or woman may be of the kind to whom nobody would dare say "Straighten Up!" But the individual's mirror may say it. Take a side view of yourself in the next full-length mirror you pass. It should show you with head erect; neck erect and free from tension; chest broad, deep, and forward of abdomen; abdomen slightly round and firm; shoulders level and free from tension; scapulæ level and fairly flat; hips level and of equal prominence; back normal physiological anteroposterior curves; spine straight and flexible; pelvis with a normal tilt; weight held directly over the longitudinal arch of foot; legs straight; feet parallel. If you do not see yourself in this normal posture, stand with the feet parallel, and, standing, grow tall from the arches, up through the trunk, pushing up towards the ceiling, the shoulders and chest relaxed. Right then and there you can see the curves slip out of your back. Right then and there, probably a second later, you can see them slip back if they have been with you long enough to feel the right of possession, and you aren't consciously on your guard to keep them at bay.

The point is more evident than subtle; more evident than acceptable—so why press it? If you are twenty, two months may clear you of the worst that may be said in this line; two months of your own effort under direction. If you are forty and have slumped physically since adolescence, you might as well face the fact that two months will not do it; but at the same time face the hope that longer time will. If you are sixty, and have held yourself erect through all the years back of you, life looks mighty good to you and will continue to do so with a far greater possibility of real living than for the man of forty who looks at it from a body thrown out of its normal posture.

CHAPTER VII

HEALTH AND PERSONALITY IN FEET

THE average person sitting facing himself on the rock looks from his posture blank down to his feet. Responsible feet. Long-suffering feet. Feet that if given a fair deal carry him with an ease which adds to his whole day's achievement. Feet that add to or take away from the expression of his personality according to the way he adds to or takes away from a sensible treatment of them. Feet that will carry with self-respecting pride a good, straight pair of legs and a fine erect trunk if the individual—the "B" health individual free from defects that would drop him to "B—"—will waken up and consider them as worthy of regard. If he is going to begin to clear his card, if he has any notion of starting to climb the health slope, he must regard those feet with increasing consideration.

He remembers that his physical examination began with his feet and that the order had seemed a natural one, since he could see that the way he used his feet—toeing out or toeing in—affected the muscles of the feet as well as the position of the trunk muscles. Naturally, then, his health prescription informed him that if he meant to correct his posture, he had to begin with his feet, work up through the knees, the trunk muscles, and finally the back of the neck and head. From what he had heard about posture he had about concluded that he had some work—due to his previous lack of information, but also due to his own carelessness—ahead of him in putting himself straight with his own physical and mental ideals.

Feet hadn't entered much into his consideration of health until now, altho they had affected very materially his physical comfort and mental stability many a day, but if they were an asset or a liability in the game, perhaps he had better look them over. From what he had gathered in the examination, the points of a good foot ran like this:

THE GOOD FOOT

(See Diagram.)

Straight line from internal malleolus to floor.

Longitudinal arch good.

Tendons allowing flexibility to right angle or beyond.

Transverse arch good.

Toes straight.

Large toe-joint good.

Free from corns.

Free from pain.



Good Longitudinal Arch.



Good Transverse Arch.

"B" will probably retreat from the contemplation of a good foot in the embarrassment he feels for his poor pair waiting loyally to play their part in the game ahead of him. Anybody is safe in drawing that conclusion, for health authorities make very clear the commonness of foot defects. According to the Surgeon General's report,¹ based on the examination of the draft in the World War, fifteen per cent. of the men examined had "important foot defects." The fact that only two per cent. of these were serious enough to cause rejection is proof enough that the rest were the result of some manner of faulty living. Among these defects, flat foot holds the highest record. If the damaged foot is eliminated by referring the examinee to the orthopedist, just as the health physician will refer all diseased conditions to the expert specializing in the treatment of them, there still will remain a vast number of those suffering from foot troubles who can relieve the condition by correcting the faulty posture in standing and walking, by taking proper exercise for strengthening the muscles, and by wearing correct shoes.

¹ Health Building and Life Extension. By Eugene Lyman Fiske. Macmillan.

If the individual is already following the suggestion with regard to attaining a good posture in standing and sitting, he has probably found that no matter how straight he sits or how straight he stands, something happens when he walks that throws him all out of plumb again. He remembers distinctly of being halted in a perfectly innocent saunter across the doctor's office by—

“TOE STRAIGHT AHEAD!”

And when he had stopped helplessly, he had been told in a tone of deep reproach, as if he might have been caught committing one of the seven deadly sins:

“You were toeing out.”

Then he had been told to gaze on this picture:
(right)



STRAIGHT FOOT WALKING.

From Pamphlet One, Positive Health Series, Women's Foundation for Health.

and then on this: (wrong)



Toeing Out and Turning Over.¹

He had been so bewildered by the doctor's tone that he had rather lost track of what had happened next, but now he knew that that was where he got those penalty checks after eversion (toeing out) and pronation (inward sagging of the ankle).

"Well, what of it?" That's what he had said; and he had been shown that he could go farther in the same number of steps by toeing straight ahead than by toeing out. He hadn't been very much impressed by that, but he had been by seeing the penalty check after postural knock-knees. No man likes to be told he is knock-kneed. When he had protested, he had been told he didn't have to continue that way.

"Toe straight ahead. Follow the directions for correcting your habitual posture, get rid of that postural curvature, those round shoulders, your wavering legs, and give your feet a chance."

His feet again. . . . He had been given some exercises for them. He might as well begin on them.

¹ From Pamphlet One, Positive Health Series, Women's Foundation for Health.

EXERCISES FOR HEALTH

DAILY FOOT EXERCISES¹
FOR SHORT TENDON ACHILLES

FLEXION

Sit on floor or bed with legs straight; flex ankle and raise toes up as far as possible toward the shin. Keep the legs still; 10 to 40 times.



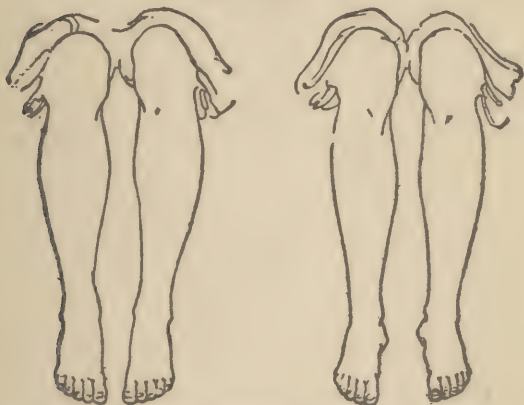
WALKING ON HEELS

Walk on heels around room, toes turned inward as if grasping marbles.

¹ From Pamphlet One, Positive Health Series, Women's Foundation for Health.

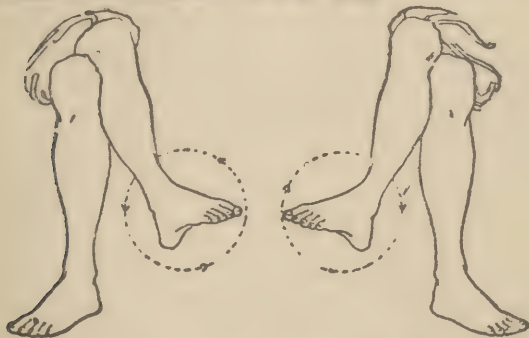
HEALTH AND PERSONALITY IN FEET 57

FOR PRONATION AND RELAXATION OF LONGITUDINAL ARCH



FOOT ROLLING OUTWARD

Sit, feet parallel; pull inner border up and out, knees held straight, toes touching floor; 20 to 40 times.



FOOT CIRCLING

Sit, right leg crossed over left knee; make circles *outward* with right foot *up*, out, down, *in*, *up*. Make strong effort on "in" and "up" and relax on "out" and "down." Alternate left and right; 20 to 40 times.

**FOOT GRIPPING**

Sit with feet apart and parallel on floor; spread toes; pull toes in and under as if taking hold on floor; repeat 20 to 30 times.

**WALKING WITH FOOT GRIPPING**

Step forward a short step with right foot, grip with right foot; advance left foot, grip with left; walk forward, grip with foot as the weight is transferred to it. *Toe straight ahead in walking.*

And then he looked again at his card. He was now down to shoes, and there was a check after "Poor"! Also there was a memory of something concerning the deplorable extent to which the feet of men had to suffer from poor shoes, or shoes poorly fitted to the feet. The figures had been gathered as a result of a foot and shoe inspection made among the American troops on the Mexican border :¹

Number of men inspected.....	30,359
Number of men wearing shoes indicated by foot measurements as correct.....	5,417
Number wearing shoes one-half size too small..	6,906
Number wearing shoes a size or more too small..	14,429
Number wearing shoes too large.....	3,511

Naturally, this man looks from his feet to those of the woman. If this condition exists among the young men of military age who have not willingly or knowingly worn the wrong kind of shoes, what would the statistics of a similar inspection reveal about the feet and shoes of women? Everybody knows—man or woman, old or young—that women's shoes, more often than not, offend one's sense of fitness, lower the idea of women's good judgment, and render ineffective adherence to many other good health rules which the woman would consider herself worse than foolish not to follow. And why?

"Because of her vanity"—says one man.

"Because she has educated her feet to wear high heels, pointed toes, and stiff (or rigid) shanks"—says another.

"Because we need her money to keep up our shops"—says a third dealer, frank in speech, if financially unscrupulous in his treatment of women. "The shoes the majority of women wear run over quicker at the heel, get out of shape generally, and

¹ From Health Building and Life Extension. By Eugene Lyman Fisk. Macmillan.

are often so uncomfortable that she buys frequently and extravagantly. Why, we couldn't keep up such shops as these, if it were not for the women. Look at me. I have worn the same last for ten years. My shoes wear months where a woman's will wear weeks."

So much for the men. What do the women have to say about the matter? They ignore the accusation of vanity. They agree with the necessity for high heels—if they wear them—but they base it on their "naturally high arches," forgetting the day when they ran sure-footed, flat-heeled, or without heels, along with Mary and Jim, and Susan and Bill. Jim and Bill still wear low heels and broad toes. Perhaps Mary does; perhaps Susan does; perhaps both; perhaps she is the only one of the five who some place along the years between twelve and sixteen suddenly developed that distinctive arch which set her foot at an angle of forty-five degrees and tipped her body so that good posture had a hard time to exist and maybe gave up the struggle.



(From Pamphlet Two, Positive Health Series, Women's Foundation for Health.)

And what about the implication the man makes about the unnecessary expenditure of money for shoes that will not stand up under wear as his will?

"We can't get good shoes," the women answer. "The dealers in our town either do not carry them, or else they fit us to something else—a something else which we finally accept in desperation."

"The women will not buy good shoes," some shoe

dealers maintain. And so the story goes. In the meantime there is a decided setting out in the direction of sensible shoes by a large percentage of women. Through a two-weeks observation of women going up and down Fifth Avenue, New York, it was discovered recently that never less than six out of ten were showing their good intention in the same way. There were never more than seven—but since the indications are that it is no longer even a fifty-fifty distribution of high heels as balancing low ones—but that the latter are in the lead—why not conclude that “my lady’s high-heeled slipper” is going the way of the high heels and long, pointed, flopping toes of the men—courtiers, scholars, and politicians—of several centuries ago.

In the meantime, in order that the woman may meet that dealer in “Woman’s Dress Shoes” with assurance—there are certain uniform requirements for a shoe that will keep a good foot normal, and will assist in giving the slightly damaged foot a chance to get back to its original healthy state. Those requirements run like this:

1. Inner line straight, conforming to the shape of the normal foot.



2. Room for free action of the toes.
3. Flexible shank.

4. Low heel.
5. Low cut oxford preferable.

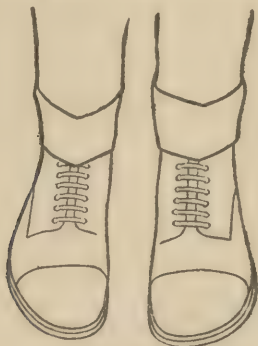


No one should have to suffer from ill-fitting shoes, and also no one should have to suffer from incorrect shoes; nobody has to be posturally knock-kneed: nobody, unless suffering from deformity, has to be anything less than erect of trunk, and straight of shoulders. In fact, nobody has to go waveringly, fearfully through life, when nature started him like this:



⁴ From Poster Four, Women's Foundation for Health.

And when he can wear shoes like this:



THE JOY OF WALKING.

Inner line straight, conforming to the shape of the normal foot.

CHAPTER VIII

WOMAN'S PLACE IN THE GAME OF HEALTH

IN THE meantime, while the man has been sitting on his stupid rock of indifference getting his health bearings and, it is to be hoped girding his loins for the upward climb, what about the woman? Whenever she has been singled out for attention she has suffered from comparison. Generally speaking, her posture is worse; and when shoes are mentioned everybody has something to say that should make her uncomfortable even if it doesn't. As for her health record as a whole, not a sufficient number of her sex have had health examinations to make possible any such record. The child welfare work has done that to a fair degree for children, and the draft examination of the World War set forth some startling statistics for men; but the health of women is, as yet, almost an unexplored segment. There are, however, disconcerting assertions concerning what may be expected, if the results of scattered experiments are accepted as a basis for estimating the whole of woman's health. For example, Dr. Mary Reesor says:

"Recent examination of a large group of industrial women showed that sixty-five per cent. suffered from digestive troubles. Of students at Bryn Mawr Summer School, twenty-one per cent. had indigestion, fifty-one per cent. had constipation; thirty-four per cent. admitted frequent headaches, and thirty-three per cent. were troubled with dysmenorrhea. Fifty-five per cent. had something the matter

with their feet, and twenty-eight per cent. were in need of dental attention. Nearly sixty per cent. of the first thousand girls examined at the Health Foundation Center were subject to headaches, forty per cent. were victims of indigestion, and a slightly larger number of constipation, while dysmenorrhea was present in half the women, and a fifth were incapacitated from this cause at least one day every month." ¹

While less is known concerning the health-rate of women than concerning the health-rate of children and of men, there are not sufficient statistics for any part of the race to form any adequate health-rate. With the present growing interest in health, somebody is going to start a campaign for adequate health statistics. Since we do have a fairly definite birth-rate and death-rate, it seems quite to the point that we should know how well we are living in between those two finalities. If such a campaign should start to-day, the women of the land would in all probability have to face the embarrassing fact that their health-rate might lower the sum total of the entire health-rate of the country. No woman would enjoy that.

But in between the time such a campaign is put on and now there is an interim when women may do much to avert that embarrassment. In fact she has already begun to sense that necessity, and if what has happened in other lines of her development—in her ability to meet requirements in the social, political, and business world—is any measure of what she may do in the development of her own mental and physical health, she bids fair not only to raise her own individual health standard, but to do a tremendous lot toward educating the general public

¹ Exercises for the Woman Who Is Well, by Mary Reesor, M. D., *Woman's Home Companion*, January, 1924.

in how to live so as to get the most out of life the year round.

This assumption is based not only on what women have accomplished in other lines, but also on what they are already doing in health education among women, for, in addition to the splendid way in which they have supported the medical profession, the health authorities, and the volunteer health organizations in the past, and are continuing to support them to-day, the organized women of America are interpreting, through the Women's Foundation for Health, a program of positive health for women. This interpretation reaches down from national, State, and local groups, to the individual woman of every class, and to all ages, from twenty on. This program suggests to the woman that, first of all, she recognize the existence of a health status which so far has been attained by less than a tenth of her sex, but which is attainable by her despite that forbiddingly low percentage—a health status that represents her own maximum possibility, physically and mentally.

This vision of health is a vision that may be common to all individuals, irrespective of sex; for health is a blessing that may be common to all. But the degree to which the woman may achieve that health is measured by the extent to which she accepts the possible existence of it for herself. In order to do that she must look upon all functions of her body as normal functions; she can not start to build towards positive health with a mental attitude that she has health-handicaps peculiar to her sex, handicaps that will always stand in the way of her living up to her best every day in the year. She can not, for instance, say in connection with the normal function of menstruation that she is "sick." To be sure there are rather common inconveniences attending this period, the result, where a diseased condition

does not exist, of the way in which women have been coddled and pampered, of the way they have coddled and pampered themselves. No woman should have a health examination without having her attention called to her responsibility for building up her health in this direction. If the examination reveals a pathological condition, the examinee should place herself under the care of a physician until she is well. But an unbelievably large number of girls and women have suffered in past years unnecessarily, and are still suffering in the same needless fashion, from painful menstruation. In many instances they have simply endured this because of the tradition that such suffering was supposed to be the common lot of women.

To-day such traditions are going the way of many other false notions concerning women's strength. Women themselves know, the greater part of them at any rate, that suffering at the menstrual period may be the result of constipation, of strain due to faulty posture or position during work; that such pain may exist with no demonstrable deviation from the normal in size or position of the reproductive organs.¹ She knows that by including plenty of leafy vegetables, fruits, and whole-grain food in the diet, by drinking six to eight glasses of water a day, by vigorous general exercise, and by special individual exercise, any woman may relieve herself of constipation. By special exercise, by walking correctly, by wearing correct shoes and clothing that permits free use of the body, she may do much to correct poor posture. With these two liabilities gone—liabilities commonly occurring not particularly with her—any woman who suffers from pain at her menstrual period will usually find herself relieved,

¹ Women's Physical Freedom, by Clelia Mosher, M. D., The Woman's Press, 1921.

unless her trouble is pathological. If, in addition to building up her general health in these two directions, she incorporate in her night and morning exercises, special ones to strengthen the abdominal muscles and to permit free circulation, if she continues these every day in the month, straight through the menstrual period, only slightly moderated in vigor, carefully, systematically, correctly done, relief will, in a large percentage of cases, be experienced. If such exercises can also be taken right when the pain begins, partial or complete relief will be experienced.

SPECIAL EXERCISE FOR MENSTRUAL DISORDERS



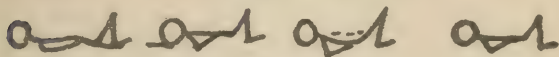
KNEE-CHEST POSITION

Hold this position and take the Mosher Exercise as follows: Raise abdomen, relax abdomen; contract abdomen forcibly, relax abdomen. Repeat rhythmically, without strain or jerking, on four counts. Five, rest; 5 times.



ROCKING HORSE

Kneel on floor; bend forward until chest nearly touches knees, arms stretched forward, hands resting on floor, shoulder distance apart. Swing body forward and down to floor, straightening knees and bending elbows; return to starting position. Repeat, swinging easily forward and back, 10 to 25 times.



MOSHER

Lie on back on floor or bed, with knees bent, feet resting on floor or bed, hand resting lightly on lower abdomen. Raise abdomen, relax abdomen; contract abdomen forcibly, relax abdomen. Repeat rhythmically, without strain or jerking, on four counts. Five, rest; 5 times.

Naturally, the wrong slant for ages can not be straightened out in one generation. For that reason every woman should begin at once in order that the next generation and the next and the next may arise and call her blessed. When the girl is righted, to begin with, in her attitude toward herself and lives accordingly, and the adult woman takes her life in her hands and adjusts her day to make the most of it, then when the dreaded menopause does come, there is a real reason to have a semi-annual health examination, because recently physicians have found simple ways to smooth nature's readjustment process, and now even the hot flushes and uncomfortable feelings can be largely done away with.

The old conception of woman's physical weakness is passing. The rapidity with which it disappears depends upon women themselves. The rapidity with which a new day dawns for them individually, depends on each woman's desire to reach her physical and mental hundred per cent. She has shown persistence, courage, vision, in attaining social and

political strength, even in the face of the handicaps she, herself, and others have insisted she accept without rime or reason. What she may attain, or the ease with which she develops what she has attained, depends on the way she accepts the challenge of her health-examination card—the challenge of her own to-day in health.

But more than that depends on her acceptance of the challenge. With her own mind catching the vision of health positive, and her own will leading her to assume her own responsibility, to accept it intelligently, she will of a certainty start the same dosage for her family and her neighbors. She always has dosed them for disease, and educated them in prevention. It is not to be expected that she will stop with health development. What she is doing to-day in preparing adequate balanced meals, in insisting on small John's health chores, she will do for herself and John Senior in balancing their day. She will also recommend all she does and all John does to her neighbors. When that day comes, Exercises for Health will enter naturally into all daily living.

CHAPTER IX

HEALTH LEVELS AGAIN

THE man and woman sitting on their stupid rocks of indifference still meditate. They have seen men and women, burdened with unnecessary physical and mental liabilities, straighten themselves and strike out vigorously up the slope past them. The woman who once wanted to be "worried about" is in the lead, independently swinging herself up the hill, vitally alive every inch of her. By craning their respective necks, they can get a glimpse of the "B—" group, fumbling along, trying to crawl back to average "B." Every now and then one of them seems to get hold of himself and take a stride of assurance upward.

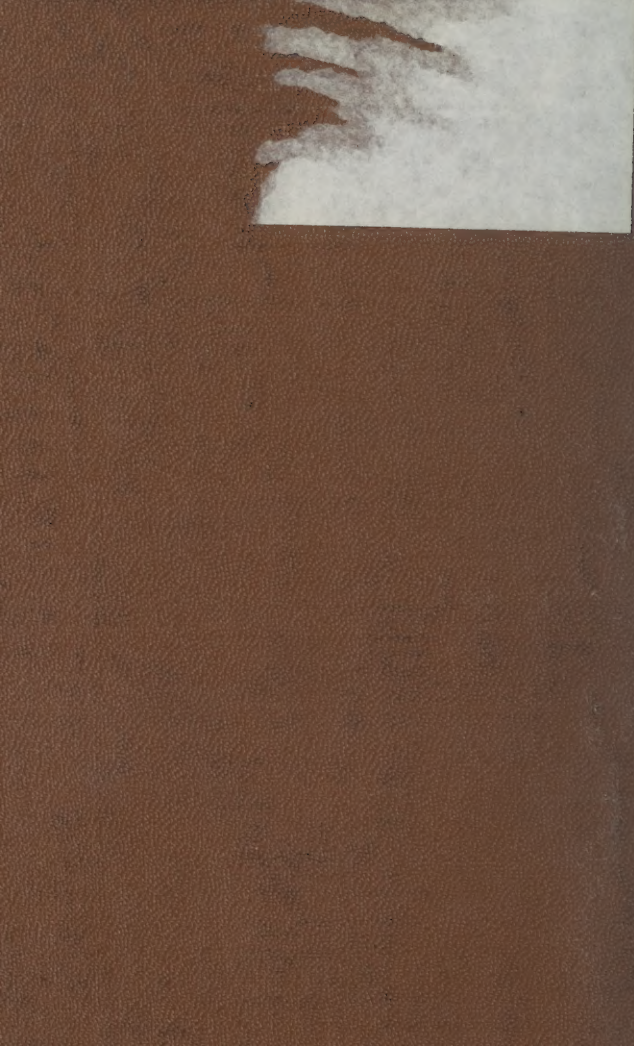
"Inoculated with the Positive Health Bug," the woman mutters, "Their tribe increases."

Gradually she swings about. The man watches her curiously and then slowly turns in the same direction. High above shines the summit of "A," windswept, sun-drenched, free. The woman climbs down, stands erect, and starts toward it. Taking his card from his pocket, the man studies it intently, then—

"All right! I'm on—," and rising—

"Twitched his mantle blue;

To-morrow to fresh woods and pastures new."



NATIONAL LIBRARY OF MEDICINE



NLM 00029583 4